

## **Agricultural Land and Deer in Missouri Survey – Results Summary**

Missouri Department of Conservation – 23 April 2021

This document provides a summary of results obtained from a survey of agricultural producers in Missouri conducted in January 2020. The survey was conducted jointly by the Missouri Department of Conservation and the United States Department of Agriculture. The survey sampled 9,000 non-agribusiness farm operations in Missouri that operate on at least five acres of land. Objectives of the survey were to obtain input from agricultural producers about deer populations and deer population management. This input, along with input from hunters and other stakeholders is important in assessing status of the deer population and informing harvest management decisions. Response to the survey was voluntary.

**1. Which one of the following best describes your farm affiliation?**

Landowner and operator – 91.44%

Operator but not landowner – 2.83%

Other – 5.73%

**2. Which statement best describes the deer population trend on and around the land you own/operate?**

The deer population is increasing – 29.28%

The deer population is stable – 48.23%

The deer population is decreasing – 11.28%

Don't know – 11.20%

**3. On the land you own/operate, do you feel there are:**

Too many deer – 23.09%

About the right number of deer – 51.12%

Too few deer – 14.34%

Don't know – 11.45%

**4. Generally, how do you feel about having deer on the land you own/operate?**

I enjoy having them around – 55.81%

I enjoy deer, but their presence causes some problems at times – 31.04%

I generally regard deer as a nuisance – 7.69%

No opinion – 5.46%

**5. Which best describes how you feel the deer population should be managed in the future? The deer population should be managed so that there is a:**

Large increase in deer numbers – 3.48%

Slight increase in deer numbers – 16.45%

Stable number of deer – 55.40%

Slight decrease in deer numbers – 16.47%

Large decrease in deer numbers – 8.20%

**6. How would you describe the level of financial loss suffered by deer on the operation in 2019?**

No financial loss – 48.37%

Slight financial loss – 28.59%

Moderate financial loss – 11.41%

Severe financial loss – 2.70%

No opinion/don't know – 8.93%

**7. What level best describes the financial loss caused in 2019 by deer for the following crops produced on the land operated?**

<i>Crops</i>	<b>Did Not Plant Crop</b>	<b>No Financial Loss</b>	<b>Slight Financial Loss</b>	<b>Moderate Financial Loss</b>	<b>Severe Financial Loss</b>	<b>No opinion/Don't know</b>
<b><i>Corn</i></b>	57.67%	6.91%	17.79%	8.75%	2.56%	6.31%
<b><i>Soybeans</i></b>	53.10%	7.75%	20.32%	9.21%	2.97%	6.64%
<b><i>Hay</i></b>	25.18%	32.75%	26.16%	5.72%	1.54%	8.64%
<b><i>Wheat/Oats</i></b>	74.97%	9.18%	5.87%	2.28%	0.45%	7.25%
<b><i>Orchards</i></b>	73.54%	9.55%	5.98%	2.05%	0.89%	7.99%
<b><i>Tree Plantations</i></b>	77.95%	8.74%	3.53%	1.22%	0.41%	8.15%
<b><i>Timber</i></b>	58.25%	27.13%	4.14%	0.85%	0.31%	9.31%
<b><i>Pasture</i></b>	24.70%	37.88%	22.97%	4.42%	1.07%	8.96%
<b><i>Nursery</i></b>	79.51%	8.98%	1.42%	1.19%	0.32%	8.57%
<b><i>Other</i></b>	76.89%	0.97%	4.77%	2.66%	0.84%	13.88%

**8. During the three-year period 2017 through 2019, has the amount of financial loss from deer on the land operated increased, decreased, or stayed the same?**

Increased – 12.63%

Stayed the Same – 61.24%

Decreased – 3.96%

Don't know – 22.18%

**9. Are you aware of options through the Missouri Department of Conservation to help address deer damage concerns on the land you own/operate?**

Yes – 35.38%

No – 64.62%

**10. Did you hunt deer during the 2019 deer season in Missouri?**

Yes – 46.73%

No – 53.27%

**11. Which of the following deer control methods were used on this operation in 2019?**

<b>Control Methods</b>	<b>Used in operation in 2019?</b>			<b>Did this action achieve desired results?</b>		
<b>No control methods used in 2019</b>	68.27%					
	<b>Yes</b>	<b>No</b>	<b>Don't know</b>	<b>Yes</b>	<b>No</b>	<b>Don't know</b>
<b>Electric fence</b>	31.13%	63.91%	4.96%	28.13%	43.75%	28.13%
<b>Deer proof fences</b>	11.11%	83.39%	5.50%	22.41%	36.21%	41.38%
<b>Allow more hunters on your farm</b>	43.26%	53.33%	3.42%	30.34%	42.13%	27.53%
<b>Encourage neighbors to allow more hunting</b>	24.64%	70.35%	5.01%	14.66%	46.04%	39.30%
<b>Chemical repellants</b>	5.62%	89.08%	5.30%	13.46%	46.15%	40.38%
<b>Changed farming practices to discourage deer</b>	6.02%	89.14%	4.84%	11.67%	47.08%	41.25%

<b>Devices to scare deer away</b>	8.92%	86.52%	4.56%	11.36%	48.35%	40.29%
<b>Other</b>	3.28%	84.66%	12.07%	11.40%	48.70%	39.90%

**12. How many deer were harvested on the land you own/operate in 2019, including deer you harvested and deer harvested by other hunters?**

Mean – 4.22 deer

**13. How do you manage deer hunting and deer harvest on the land you own/operate?**

I do not allow deer hunting – 20.88%

I restrict both buck and doe harvest – 8.63%

I restrict doe harvest but not buck harvest – 2.60%

I restrict buck harvest but not doe harvest – 6.69%

I do not restrict the number or type of deer harvested – 44.76%

I do not make decisions about deer management – 16.44%

**14. Do you charge fees for access to hunt deer on the land you own/operate?**

Yes – 2.67%

No – 97.31%

Don't know – 0.02%

**15. How do you feel about the way the Missouri Department of Conservation (MDC) manages deer?**

Very satisfied – 13.97%

Satisfied – 27.96%

Neither satisfied nor dissatisfied – 21.57%

Dissatisfied – 9.44%

Very dissatisfied – 4.20%

No opinion – 22.86%

**16. Which of the following best describes how current antlerless permit availability impacts your ability to manage deer on the land you own/operate?**

Appropriate – 32.09%

Too restrictive – 12.28%

Too liberal – 3.36%

No opinion – 52.27%

**17. Regarding the deer on and around the land you own/operate, how much of a problem is each of the following?**

	Not a problem	Somewhat of a problem	A great problem	Don't know/not applicable
<i>Crop/property damage</i>	53.46%	31.43%	7.00%	8.12%
<i>Deer hunters who trespass</i>	48.80%	34.22%	9.22%	7.77%
<i>Dogs running deer</i>	67.64%	17.01%	4.36%	10.99%
<i>Deer/vehicle collisions</i>	37.63%	36.65%	18.32%	7.40%
<i>Road hunting/spotlighting</i>	53.99%	21.34%	8.88%	15.79%

**18. In which county is most of the land you own/operate located?**

All counties were represented with between 0.17% and 1.97% of the total respondents.

**19. The primary use of the land you own/operate is:**

Crop production – 28.26%  
 Livestock production – 52.22%  
 Hunting/fishing/wildlife – 8.29%  
 Timber production – 1.81%  
 Other – 9.42%

**20. How many acres of land do you own/operate?**

Mean – 357.20 acres

**21. Your Age:**

Under 18 – 0.13%  
 18-30 – 0.88%  
 31-40 – 4.29%  
 41-50 – 8.67%  
 51-60 – 19.89%  
 Over 60 – 66.15%

**22. Are you currently working with one or more of your neighbors to manage deer on the land you own/operate?**

Yes – 13.18%  
 No – 86.82%

**23. If no, would you be willing to work with your neighbors to manage deer on the land you own/operate?**

Yes – 49.88%  
 No – 50.12%